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ABSTRACT

This paper describes the development and validation of measures of students' and teachers' perceptions of the extent to which their school is a community. Community, in this instance, focuses on the quality of social relationships in the school. The development of measures of school community is reported, and the construct validity of these measures is investigated, as are relationships between students' and teachers' perceptions of the school's characteristics. Subjects were approximately 550 teachers and 4,000 students in grades 3 through 6 from 24 elementary schools across the United States. Developed questionnaires were administered individually to teachers and by group to students. Nine student items and two teacher items were dropped to prepare final measures. Results of these measures indicate that schools where teachers feel a strong sense of community are not necessarily those where students feel a strong sense of community, and vice versa, although within a school, students tended to have the same feelings, and teachers tended to have similar feelings about community. Items associated with a sense of community for each group are identified. (Contains 6 tables, 1 figure, and 13 references.) (SLD)

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Assessing Students' and Teachers' Sense of the School as a Caring Community

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Assessing Students' and Teachers' Sense of the School as a Caring Community

There recently has been renewed appreciation of the importance of the social context of the school to effective practice. In particular, the concept of the school as a "community" is becoming quite common in discussions of effective schools (e.g., Brandt, 1992; Hallinger & Murphy, 1986; Sizer, 1984), and while the empirical research on schools as communities is still quite limited, the findings are consistent in suggesting that there are a wide range of benefits for students and teachers who experience their schools as communities (e.g., Arhar & Kromrey, 1993; Battistich et al., in press; Bryk & Driscoll, 1988; Goodenow, 1993; Hallinger & Murphy, 1986). Unfortunately, additional research in this area is hampered by the lack of conceptually-derived, reliable and valid measures of the extent to which a school can be characterized as a community for students and teachers. This paper describes the development and validation of measures of students' and teachers' perceptions of the extent to which their school is a community.

The term community has both a geographical and a social-psychological or "relational" meaning (Gusfield, 1975), both of which may be applied to schools. However, while it is true that a school is a place where people interact, our use of the term "community" here is focused on the *quality of social relationships* among school members. Although various definitions of the "sense of school community" have been used in the literature, several common or "core" elements can readily be distinguished. Conceptually, a community is defined as a place where members: (a) care about and support one another; (b) actively participate in and have influence on the group's activities and decisions; (c) feel a sense of belonging and identification with the group; and (d) have common norms, goals, and values (cf. Bryk & Driscoll, 1988; McMillan & Chavis, 1986).

Operationally, however, measures of the school as a community generally have underrepresented the construct as defined above. Bryk and Driscoll (1988) have perhaps come closest to operationalizing the construct of school as community. Their measure (constructed *post hoc* from variables included in the *High School and Beyond* data base; see Peng, 1983) included multiple indicators of shared values and a common agenda of activities, but did not represent caring and supportive social relations among members or members' influence on group activities or decisions. Their measure also relied very heavily on teacher reports and perceptions, with very little information about student experiences, and emphasized the structural or organizational elements of school community, rather than the affective and behavioral elements. Other researchers generally have examined *students'* perceptions of the school as a community, but have focused narrowly on the sense of belonging—i.e., feelings of being accepted, liked, and valued—in their assessment of community (e.g., Arhar & Kromrey, 1993; Goodenow, 1993).

The present research has three purposes: First, it reports on the development of measures of the school as a community that more adequately represent the conceptual definition of community, and that assess school community from the perspective of both students and teachers. Second, it examines the construct validity of the measures, the extent to which scores can be said to reflect a characteristic of schools, and the relationship between students' and teachers' perceptions of the extent to which the school is a community. Third, it investigates the relationships between students' and teachers' perceptions of the school as a community and theoretically relevant measures of school structural and compositional characteristics (e.g., size, SES, ethnic diversity), school practices and climate, and student and teacher attitudes, motives, and behavior.

Method

Subjects and Design

Subjects were approximately 550 teachers and approximately 4,000 third through sixth grade students from 24 elementary schools located in six different school districts across the United States—three on the West Coast, one in the South, one in the Southeast, and one in the Northeast. The schools in the sample (four from each district) are quite diverse. Eleven of the schools are in large cities, four are in smaller cities, and nine are in suburban or rural communities. Some of the schools have fewer than 300 students, and others have student bodies approaching 1,000. The student populations at the schools also vary greatly, ranging from 2% to 95% poor (i.e., receiving subsidized school lunches), 26% to 100% members of minority groups, 0 to 32% limited or non-English speaking, and with average achievement ranging from the 24th to the 67th percentile on standardized tests.

The data were collected during the initial phase of an ongoing, four-year investigation of schools as communities. Data collected during this initial phase of the project were used to refine measures of key variables to be assessed during the remainder of the project, and to provide baseline measures for use in assessing change during subsequent years. Following the initial data collection, 12 of the participating schools (two per district) began implementing an intervention program designed to enhance school community. (The remaining 12 schools are serving as a comparison group for evaluating the effectiveness of the intervention program.)

Item Pool For Assessing Perceptions of the School as a Community

Students' sense of the school as a community. The initial item pool for assessing students' sense of community included 47 items. These items assessed perceptions of *collaborative and supportive relationships among students* (e.g., "Students in this school work together to solve problems," "Students in this school help each other, even if they are not friends"); *positive relations between students and teachers* (e.g., "Teachers and students treat

each other with respect in this school"); *closeness and intimacy* (e.g., "My class is like a family," "I feel that I can talk to the teachers in this school about things that are bothering me"); *student participation and influence* (e.g., "In my class, students have a say in deciding what goes on," "The teacher in my class asks the students to help decide what the class should do"), including participation in norm-setting (e.g., "In my class the teacher and students decide together what the rules will be"); and *an ethic of caring* (e.g., "People care about each other at this school"). Items assessed students' perceptions of interpersonal relationships in general, and also their individual feelings of being cared about and supported (e.g., "My classmates care about my work as well as their own;" "When I'm having trouble with my schoolwork, at least one of my classmates will help me"). Perceptions of the quality of interpersonal relationships were assessed both for the student's own classroom and for the school as a whole. Items assessing student participation and influence, however, were restricted to the context of the classroom because we felt that classroom activities provided the most meaningful and important opportunities for exercising influence for elementary school students. Responses to attitudinal items (e.g., "My class is like a family") were recorded using a five-point Likert format ranging from *disagree a lot* (1) to *agree a lot* (5). Responses to behavioral items (e.g., "The teacher in my class asks the students to help decide what the class should do") were recorded using a five-point frequency scale ranging from *never* (1) to *always* (5). Approximately one-third of the items were phrased in a negative direction to control for "response set."

Teachers' sense of the school as a community. The initial item pool for assessing teachers' sense of the school as a community included 15 items.¹ These items assessed

¹Many of these items were taken or adapted from questionnaires used in studies of teacher communities conducted by the Center for Educational Research at Stanford.

perceptions of *collaborative and supportive relationships among staff* (e.g., "There is a great deal of cooperative effort among staff members," "Teachers are supportive of one another"); *closeness* ("This school seems like a big family, everyone is so close and cordial"); *teacher participation and influence* (e.g., "Staff are involved in making decisions that affect them," "Teachers take a major role in shaping the school's norms, values, and practices"); and *shared goals and values* (e.g., "Most of my colleagues share my beliefs and values about what the central mission of the school should be"). The response scale was a five-point Likert format ranging from *strongly disagree* (1) to *strongly agree* (5). About one-third of the items were phrased in a negative direction.

Procedures

The items used for developing the measures of the school as a community were included in questionnaires administered to teachers and upper-grade students in the spring of the school year. The teacher questionnaires were completed individually; the student questionnaires were group-administered. The questionnaires also included measures of classroom practices, school climate, and students' and teachers' attitudes, motives, and behavior, for use in validating the measures of school community. Other relevant data were obtained from district and school records (e.g., school size, percentage of students receiving free school lunch, student and teacher demographic characteristics, student achievement test scores).

Results

Scale Reduction and Internal Consistency

Nine student items and two teacher items were dropped because preliminary analyses indicated that they had low variability or low communality with other items in the sense of community scales. The final measure of student sense of school community contained 38 items, and showed high internal consistency ($\alpha = .91$). The psychometric

properties of this 38-item measure of students' sense of the school as a community are summarized in Table 1.

Table 1 here

Principal components analysis showed that all of the student community items had moderate to large positive loadings on the first unrotated principal component (see Table 1), suggesting that they could be aggregated into a single summary score. An alpha factor analysis (Kaiser & Caffrey, 1965) of the student items suggested that the items clustered into three reliable factors. The loadings of the items on these three factors, following oblique rotation, also are shown in Table 1. Items with their largest loadings on Factor 1 represent *collaboration, helping, and closeness*. Factor 2 clearly represents *student influence*, and Factor 3 represents *positive interpersonal relations*. Factor 1 was moderately positively correlated with both Factor 2 ($r = .41$) and Factor 3 ($r = .50$); Factors 2 and 3 were less strongly intercorrelated ($r = .25$).

The final measure of teacher sense of community contained 13 items and also showed high internal consistency ($\alpha = .89$). As shown in Table 2, all 13 of the teacher community items had large positive loadings on the first unrotated principal component, once again indicating that they could be aggregated into a single summary score.

Table 2 here

An alpha factor analyses of these items indicated that they clustered into two reliable groups. Factor loadings of the items, following oblique rotation, also are shown in Table 2. The first factor is defined by items involving teacher *collegiality* and *shared goals*

community, there also is a significant degree of commonality among students and teachers within a school.

Structural model of school community. Given evidence of internal consistency, convergent validity, and some degree of commonality among students and teachers on the measures of school community, we next examined the relationship between students' and teachers' perceptions of the school as a caring community more fully. Figure 1 summarizes the findings from a confirmatory factor analysis of these data, conducted on school-level aggregated scores. Two correlated latent factors, one representing student community and the other representing teacher community, provided a very good fit to the data ($\chi^2 (19) = 23.61, p > .20$; Comparative Fit Index [CFI: Bentler, 1990] = .956). Both a model with two uncorrelated factors ($\chi^2 (20) = 29.66, p < .08$; CFI = .907), and a model with a single latent factor ($\chi^2 (20) = 48.88, p < .001$; CFI = .721) had significantly poorer fits to the data. Thus, while the average sense of community among students and teachers in a school are positively correlated, they do not appear to represent a single, underlying dimension of school community, at least in this sample.

Figure 1 here

Subgroup Differences in Sense of School Community

Although the differences are not large, females generally scored higher than males in the sense of school community among both students (M 's = 3.01, 2.91 for females and males, respectively; $F (1, 4523) = 32.05, p < .0001$) and teachers (M 's = 3.84, 3.66 for females and males, respectively; $F (1, 485) = 2.91, p < .09$). Sense of community among students also varied significantly by ethnicity ($F (4, 4501) = 21.63, p < .0001$). On average, Asian ($M = 3.13$) and Hispanic students ($M = 3.05$) scored higher than White

and values; the second factor represents teacher *influence and participation in decision-making*. The two factors were intercorrelated .50.

Scale scores representing students' and teachers' sense of the school as a community were constructed by averaging responses across the constituent items.

Convergent Validity and Relationship Between Students' and Teachers' Sense of School Community

In addition to the measure of school as a community for teachers, teachers also completed a measure of their perceptions of the school as a community for *students* (i.e., perceived caring, supportive, and collaborative student relationships, perceived student influence). The correlation between students' sense of community (aggregated to the classroom level) and teachers' perceptions of student community was .35 ($p < .001$), demonstrating a fair degree of convergent validity. However, the correlation between the measures of students' sense of school community and teachers' sense of school community, while positive, was not statistically significant ($r = .10, p < .15$). This suggests that schools where teachers feel a strong sense of community are not necessarily places where students feel a strong sense of community, and vice versa.

Although the sense of community among teachers and among students do not appear to be strongly related in this sample, there does appear to be significant variability between schools in both students' and teachers' average sense of school community. A random-effects ANOVA, with teachers nested within schools, indicated that 35% of the variability in sense of school community for teachers was between schools. For students' sense of community, a random-effects ANOVA (with classrooms nested within schools and students nested within classrooms) indicated that about 15% of the variance was between schools, and an additional 15% of the variance was between classrooms within schools. Thus, although there clearly are substantial individual-differences among both students and teachers in their sense of school

($M = 2.95$) and African-American students ($M = 2.84$). Ethnic differences in sense of school community among teachers showed the same pattern, but were not statistically significant ($F(4, 470) < 1.00$). Finally, sense of community among students declined significantly with increasing grade ($F(3, 4525) = 16.18, p < .0001$).

Relationships Between Sense of Community and Other School Characteristics

School-level correlations between student and teacher sense of community scores and other school characteristics are presented in Table 3. Two findings are particularly noteworthy. First, contrary to what might be expected, students' sense of community is *not* significantly related to school size, while teachers' sense of community is *positively* correlated with school size in this sample.

Table 3 here

The second finding is that sense of community among both students and teachers is negatively correlated with school poverty level. The deleterious effects of poverty are well known, and this finding indicates that the school experience generally is less pleasant and rewarding for both students and teachers in poor communities than it is in more affluent communities. Given the strong relationship between community and poverty (both aggregated to the school level) in this sample, it is important to control for poverty level when examining the school-level relationships of sense of community to other characteristics of students and teachers.

Relationships Between Sense of Community and Classroom Practices

Correlations between students' and teachers' sense of school community and several observational measures of classroom practices are presented in Table 4. Teachers' sense of school community was essentially unrelated to these observed classroom practices. This is not particularly surprising given that, for teachers, sense of community is largely

determined by relationships with other teachers and participation in activities outside of the classroom (e.g., faculty meetings).

Table 4 here

Students' sense of school community, on the other hand, is expected to be related to classroom experiences. With one exception (i.e., the small positive association between sense of community and academic competitions), the pattern of relationships in Table 4 is generally consistent with expectations. Students' sense of community was positively associated with cooperative activities, and emphasizes on interpersonal understanding and prosocial values. However, except for the moderate associations between sense of community and cooperation, these relationships were smaller in magnitude than was expected. Further examination of the relationships between classroom practices, student behavior, and students' sense of community may be found in Kim, Solomon, and Roberts (1995).

Relationships Between Sense of Community, Teacher Attitudes, and School Climate

As shown in Table 5, both students' and teachers' sense of school community were significantly associated with teacher attitudes and perceptions of school climate. As might be expected, the relationships generally were stronger for teachers' sense of community than students' sense of community (particularly when student poverty level was controlled). However, most of the associations with teacher attitudes and school climate were statistically significant for both students' and teachers' sense of community, and all are consistent with expectations—i.e., sense of community is associated with more desirable teacher attitudes and a more positive school climate.

Table 5 here

Relationships Between Sense of Community and Student Attitudes, Motives, and Behavior

Teachers' sense of school community generally was not found to be significantly associated with student attitudes, motives, or behavior. However, as expected, students' sense of community was significantly correlated with virtually all of the measures of student attitudes, motives, and behavior. These relationships are summarized in Table 6.

Table 6 here

Students' sense of community was consistently, and often quite strongly, associated with a positive orientation toward school and learning (e.g., liking for school, task orientation toward learning, trust in and respect for teachers, academic self-esteem), and with prosocial attitudes, motives, and behavior (e.g., concern for others, social competence, intrinsic prosocial motivation, altruistic behavior). On the other hand, students' sense of community was not as strongly associated with academic performance, and the modest correlations at the school level disappeared entirely when student poverty level was controlled.

Conclusions

The importance of the social context of schools to educational outcomes has been emphasized in much recent educational and psychological literature on school "communities," and a small number of empirical studies have provided evidence of the

importance of school community for students and teachers in intermediate (e.g., Arhar & Kromrey, 1993; Goodenow, 1993) and secondary schools (e.g., Bryk & Driscoll, 1988). The present study adds to this growing body of work by describing the development of reliable and valid measures of elementary school students' and teachers' sense of school community, and providing preliminary evidence of the importance of school community for students and teachers in elementary schools, as well. It is hoped that the measures of students' and teachers' sense of school community examined here will be a useful tool for other investigators concerned with social and contextual influences in education.

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Table 1
Psychometric Properties of Student Sense of School Community Scale

Item	Loadings on First Principal Component (unrotated)	Item-Total Correlation	Alpha Factor Loadings (oblique rotation)		
			Factor 1	Factor 2	Factor 3
People care about each other in this school.	.66	.60	.60		
Students in my class treat each other with respect.	.65	.60	.41		.30
Students in this school treat each other with respect.	.64	.58	.57		
Students at this school are willing to go out of their way to help someone.	.63	.56	.66		
Students at this school really care about each other.	.63	.56	.58		
Students in my class help each other learn.	.59	.53	.55		
Students at this school work together to solve problems.	.58	.51	.55		
My school is like a family.	.58	.51	.64		
When I'm having a problem, some other student will help me.	.57	.51	.51		
When someone in my class does well, everyone in the class feels good.	.57	.51	.49		
Students in my class work together to solve problems.	.56	.51	.37		
Teachers and students treat each other with respect in this school.	.55	.50	.48		

Table 1 (cont.)

Item	Loadings on First Principal Component (unrotated)	Item-Total Correlation	Alpha Factor Loadings (oblique rotation)		
			Factor 1	Factor 2	Factor 3
Students in my class help each other, even if they are not friends.	.55	.49	.53		
Students in this school help each other, even if they are not friends.	.53	.46	.62		
My class is like a family.	.51	.46	.54		
When I'm having trouble with my schoolwork, at least one of my classmates will try to help.	.48	.43	.33		
Students in my class are willing to go out of their way to help someone.	.46	.40	.52		
I feel that I can talk to the teachers in this school about things that are bothering me.	.42	.37	.41		
My classmates care about my work just as much as their own.	.40	.35	.44		

Table 1 (cont.)

Item	Loadings on First Principal Component (unrotated)	Item-Total Correlation	Alpha Factor Loadings (oblique rotation)		
			Factor 1	Factor 2	Factor 3
In my class the teacher and students together plan what we will do.	.46	.43		.49	
The teacher in my class asks the students to help decide what the class should do.	.44	.41		.57	
In my class the students get to help plan what they will do.	.43	.40		.60	
In my class the teacher and students decide together what the rules will be.	.41	.39		.62	
In my class students have a say in deciding what goes on.	.40	.37		.40	
In my class I get to do things that I want to do.	.38	.36		.58	
The teacher lets us do things our own way.	.32	.30		.50	
Students in my class can get a rule changed if they think it is unfair.	.29	.27		.47	
The teacher lets me choose what I will work on.	.27	.25		.43	
In my class the teacher is the only one who decides on the rules. [R]	.26	.25		.53	

Table 1 (cont.)

Item	Loadings on First Principal Component (unrotated)	Item-Total Correlation	Alpha Factor Loadings (oblique rotation)		
			Factor 1	Factor 2	Factor 3
Students in my class are mean to each other. [R]	.48	.45			.62
The students in this school don't really care about each other. [R]	.45	.41			.59
Students in this school are just looking out for themselves. [R]	.44	.41			.53
The students in my class don't really care about each other.	.42	.39			.53
Students in my class just look out for themselves. [R]	.41	.38			.52
A lot of students in my class like to put others down. [R]	.40	.37			.48
Students in my class don't get along together very well. [R]	.38	.35			.57
Teachers and students in this school don't seem to like each other. [R]	.37	.34			.37
Students in this school don't seem to like each other very well. [R]	.35	.33			.56

Note. [R] indicates a reverse-scored item. Factor loadings < .25 not shown. Factor intercorrelations: 1 & 2 = .41, 1 & 3 = .50, 2 & 3 = .25.

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Table 2
Psychometric Properties of Teacher Sense of School Community Scale

Item	Loadings on First Principal Component	Item-Total Correlation	Alpha Factor Loadings (oblique rotation)	
	(unrotated)		Factor 1	Factor 2
There is a great deal of cooperative effort among staff members.	.85	.80	.82	
In this school, there is a feeling that everyone is working together toward common goals.	.81	.75	.63	.25
Teachers are supportive of one another.	.77	.71	.89	
This school seems like a big family, everyone is so close and cordial.	.77	.71	.74	
Teachers frequently consult with and help one another.	.76	.69	.71	
You can count on most staff to help out anywhere, anytime - even though it may not be part of their official assignment.	.75	.68	.74	
Teachers at this school keep to themselves. [R]	.64	.57	.59	
Most of my colleagues share my beliefs and values about what the central mission of the school should be.	.64	.56	.66	
The faculty here fall into conflicting cliques. [R]	.59	.51	.64	
Teachers take a major role in shaping the school's norms, values and practices.	.75	.70	.26	.65
The principal usually consults with staff before she or he makes decisions that affect us.	.61	.56		.81
Teachers take an active role in planning at this school.	.61	.56		.74
Staff are involved in making decisions that affect them.	.57	.52		.88

Note. [R] indicates a reverse-scored item. Factor loadings < .25 not shown. Factor intercorrelation = .50.

Table 3
Relationships Between Students' and Teachers' Sense of Community
and Other School Characteristics

	Student Community	Teacher Community
Average Age of Teachers	.01	-.30
Average Number of Years Teaching	.10	-.30
Average Number of Years in Present School	.04	-.17
Number of Teachers in School	.04	.35 [†]
Percent Minority Teachers	.04	-.11
Percent Female Teachers	.25	.14
Average Teacher Education (highest academic degree)	-.05	-.15
Number of Enrolled Students	.17	.48**
Percentage of Poor Students	-.61**	-.40*
Percentage of Chapter 1 Students	-.37 [†]	.00
Percentage of Limited/Non-English Speaking Students	.17	.12
Percentage Minority Students	-.16	-.19

Note. Data are aggregated school-level scores ($n = 24$).

[†] $p < .10$

* $p < .05$

** $p < .01$

Table 4
Relationships Between Students' and Teachers' Sense of Community
and Observed Classroom Practices

	Student Community ^a	Teacher Community ^b
Frequency of Cooperative Learning Activities	.22**	-.02
Frequency of Class Meetings	.09	-.10*
Frequency of Whole Class Instruction	-.12 [†]	.11*
Frequency of Academic Competitions	.11 [†]	-.04
Emphasis on Student Thinking and Expression	.13 [†]	-.05
Emphasis on Prosocial Values	.17**	.01
Emphasis on Interpersonal Understanding	.17**	.02
Emphasis on Intrinsic Motivation	.11 [†]	.12*
Encouragement of Cooperation	.32**	-.03
Use of Reward and Punishment	-.07	.03

^aClassroom-level aggregate scores, upper-grade classrooms ($n = 231$).

^bTeachers at all grade levels ($n = 469$).

[†] $p < .10$

* $p < .05$

** $p < .01$

Table 5

Relationships Between Students' and Teachers' Sense of Community, Teacher Attitudes, and School Climate

	<u>Student Community</u>			<u>Teacher Community</u>		
	Class- Level ^a	School-Level ^b		Teacher- Level ^c	School-Level ^b	
<u>Teacher Attitudes</u>						
High Expectations for Student Learning	.22**	.51**	(.38 [†]) ^d	.16***	.70***	(.64**) ^d
Belief in Constructivist Learning	.20**	.49*	(.32)	.19***	.45*	(.33)
Trust in Students	.22**	.57**	(.40*)	.10*	.46*	(.34)
Emphasis on Teacher Authority	-.19**	-.53**	(-.41*)	-.14***	-.43*	(-.32)
Sense of Efficacy as a Teacher	.13*	.51**	(.33)	.27***	.59**	(.50**)
Enjoyment of Teaching	.26***	.51**	(.33)	.48***	.79***	(.75***)
Overall Job Satisfaction	.17**	.43*	(.27)	.44***	.82***	(.78***)
<u>School Climate</u>						
Principal Competence and Supportiveness	.02	.37 [†]	(.14)	.68***	.86***	(.83***)
Parent Supportiveness	.21**	.70***	(.46*)	.48***	.63***	(.55**)
Stimulating Learning Environment	.17**	.60**	(.38 [†])	.70***	.84***	(.81***)
Positive Teacher-Student Relations	.30***	.66***	(.45*)	.62***	.82***	(.80***)

^aClassroom-level aggregate scores, upper-grade classrooms ($n = 231$).^b $n = 24$.^cTeachers at all grade levels ($n = 469$).^dPartial correlations, controlling for percentage of poor students.[†] $p < .10$; * $p < .05$; ** $p < .01$; *** $p < .001$

Table 6

Relationships Between Students' Sense of Community and Student Attitudes, Motives, and Behavior

	<u>Sense of Community</u>		
	Student-Level	School-Level	
<u>Academic Attitudes, Motivation, and Behavior</u>			
Frequency of Reading Outside of School	.12***	.49**	(.32) ^a
Enjoyment of Reading	.23***	.05	(.31)
Enjoyment of Class	.50***	.75***	(.58**)
Liking for School	.52***	.82***	(.70***)
Task Orientation	.39***	.72***	(.69***)
Ego Orientation	-.15***	-.12	(-.28)
Work Avoidance	-.18***	-.11	(-.35 [†])
Preference for Challenge ^b	.09**	.38*	(.06)
Intrinsic Academic Motivation	.20***	-.14	(.32)
Academic Self-Esteem	.21***	.50**	(.02)
Trust in and Respect for Teachers ^c	.39***	.61**	(.58**)
Enjoyment of Helping Others Learn	.36***	.65***	(.40*)
Educational Aspirations ^d	.09**	.66***	(.39 [†])
Educational Expectations ^d	.13***	.56**	(.22)
<u>Academic Performance</u>			
Achievement Test Scores: Reading	.10**	.55**	(.07)
Achievement Test Scores: Mathematics	.10**	.59**	(.17)
Inductive Reasoning Skill ^d	.06*	.45*	(-.08)

Table 6 (cont.)

	<u>Sense of Community</u>		
	Student-Level	School-Level	
<u>Social/Personal Attitudes, Motives, and Behavior</u>			
Concern for Others	.37***	.73***	(.51**)
Sense of Autonomy	.06***	.38 [†]	(-.27)
Sense of Efficacy	.14***	.59**	(.38 ⁺)
Conflict Resolution Skill	.27***	.77***	(.78***)
Acceptance of Outgroups ^b	.18***	.39 [†]	(.38 [†])
Intrinsic Prosocial Motivation	.25***	.60**	(.46*)
Democratic Values	.09***	.57**	(.19)
Altruistic Behavior	.23***	.42*	(.53**)
General Self-Esteem	.20***	.33	(.05)
Loneliness at School ^c	.22***	-.22	(.35)
Social Competence	.39***	.63**	(.46*)

Note. Except as noted, $n = 4,500$ for student-level correlations. $N = 24$ for school-level correlations.

^aPartial correlations, controlling for percentage of poor students.

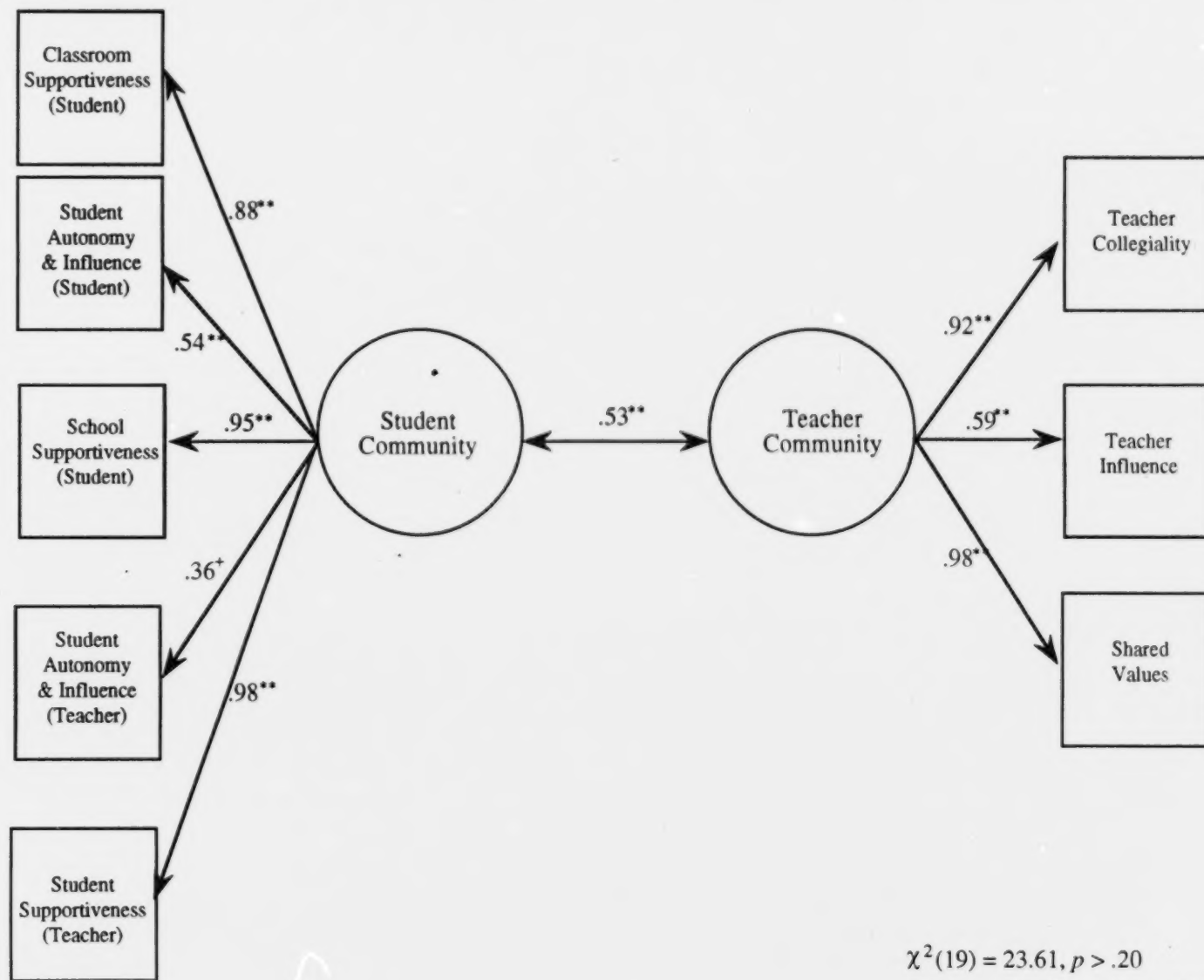
^bStudents at Grade 3 or 4 only, $n = 1,400$.

^cStudents at Grade 4 or 5 only, $n = 1,350$.

^dStudents at Grade 5 or 6 only, $n = 1,300$.

[†] $p < .10$; * $p < .05$; ** $p < .01$; *** $p < .001$

Figure 1. Structural Model of Student' and Teachers' Sense of School Community



$\chi^2(19) = 23.61, p > .20$
Comparative Fit Index = .956